

REMARKS

Claim 1 is pending in the application.

Claim 1 stands rejected.

Claim 1 has been amended.

Claims 2-15 have been added.

Rejection of Claims under 35 U.S.C. §101

Claim 1 stands rejected under 35 U.S.C. §101 because the claimed invention is directed to non-statutory subject matter.

Applicants respectfully submit that the claimed invention is not simply the manipulation of an abstract idea and does not read on a mental process, but is indeed statutory subject matter. Not only does the claimed invention provide useful, concrete and tangible results, as well as advancing the technological arts, but (as can be seen in claim 1) is drawn to a method that estimates an expected component surplus. Applicants respectfully argue that this expected component surplus is a tangible result (an expected amount of components left available for use in other products). This method of the claimed invention is statutory subject matter because of the physical nature of the amount of components claimed. Applicants therefore respectfully submit that claim 1 is drawn to statutory subject matter.

As to the question of this method being simply an abstract idea, Applicants note that any step-by-step process, whether it is electronic, chemical, or mechanical, involves an “algorithm” in the broadest sense of the term. *See State Street Bank & Trust Co. v. Signature Fin. Group, Inc.*, 149 F.3d 1368, 1374-75, 47 USPQ2d 1596, 1502 (Fed. Cir.

1998), cert. denied, ---U.S.--- 119 S. Ct. 851 (1999). The Supreme Court noted that “unpatentable mathematical algorithms are identifiable by showing that they are merely abstract ideas constituting disembodied concepts or truths that are not ‘useful.’ …To be patentable an algorithm must be applied in a ‘useful’ way.” Id. At 1373, 47 USPQ2d at 1601. Applicants therefore respectfully assert that estimating an expected component surplus is applying the use of mathematics in a useful way.

While Applicants believe that claim 1 in its original form was sufficient for purposes of this distinction, in order to more clearly point out the fact that the claimed invention is not simply an abstract idea and does not simply read on a mental process, claim 1 has been amended to recite “estimating an expected component surplus,” which was heretofore substantially recited in the preamble of the claims. Moreover, claim 1 now recites a computer-implemented method. Applicants therefore respectfully submit that the invention claimed in claim 1 is statutory subject matter under 35 U.S.C. §101. Applicants also therefore respectfully submit that the invention claimed in new claims 2-15 are also directed to statutory subject matter, for at least the foregoing reasons. Moreover, claims 6-10 are directed to an apparatus, and claims 11-15 are directed to a computer program product, both claim types accepted as statutory subject matter.

Rejection of Claims under 35 U.S.C. §112

Claim 1 stands rejected under 35 U.S.C. §112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which Applicant regards as the invention. Applicants have amended claim 1 to address the Examiner’s concerns, and thank the Examiner for his careful reading of the claim.

Applicants respectfully submit that these amendments address the bases for this rejection, and that claim 1 is in condition for allowance.

Rejection of Claims under 35 U.S.C. §103

Claim 1 stands rejected under 35 U.S.C. §103(a) as being unpatentable over Huang et al., U.S. Patent No. 5,953,707 (Huang). Applicants respectfully traverse this rejection.

Applicant respectfully submits that the claimed invention is not made obvious by Huang, either taken alone or in permissible combination with other references or skill in the art at the time of invention. As an initial matter, Applicant respectfully submits that the rejection lacks the requisite clarity. The Court of Appeals for the Federal Circuit has set forth requirements for rejections based on 35 U.S.C. § 103, which Applicant respectfully submits have not been met in at least the rejection of independent claims 1, 8, 13, and 15-16. “To reject claims in an application under section 103, an examiner must show an unrebutted *prima facie* case of obviousness. In the absence of a proper *prima facie* case of obviousness, an applicant who complies with the other statutory requirements is entitled to a patent.” *In re Rouffet*, 149 F.3d 1350, 1355, 47 USPQ2d 1453, 1456 (Fed. Cir 1998) (citations omitted). Applicant respectfully submits that the rejection fails to meet the requirements set forth, as the rejection is not clear as to the elements of Huang that correspond to the claimed elements. In fact, no specific citation whatsoever of sections of or elements disclosed in Huang, on which claim 1 might read, are provided. Applicant therefore respectfully requests clarification of the rejection as to the correspondence between the elements of Huang and those of the claimed invention, as

claimed in claim 1, be demonstrated. Nevertheless, Applicants have made every attempt to respond to the rejections recited in the Office Action.

As to the rejection of claim 1, Applicants respectfully submit that the claimed invention is not made obvious by Huang, either taken alone or in permissible combination with other references or skill in the art at the time of invention. First, Applicants are unable to find taught, suggested or shown anywhere in Huang an uncancelable level for a selected component, as recited in claim 1. This is not unexpected, because Huang is concerned with presenting a decision-maker with data regarding various supply chain scenarios. Applicants are unable to find taught, suggested or shown anywhere in Huang the recognition of an uncancelable level for a selected component, below which the quantity of the selected component cannot be liquidated without incurring a charge, as substantially recited in claim 1.

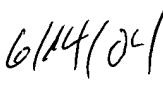
Applicants further respectfully submit that the Office Action correctly notes that a vector of connect rates for the components is also not taught, suggested or shown by Huang. However, Applicants respectfully submit that a vector of connect rates for the components would not have been obvious to one of skill in the art at the time of invention. An example of the vector of connect rates for the components is given as part of the description of step 212 or Fig. 2, and is defined in the computation of the expected surplus (ei) using an adjusted plan ($ei = di0 - ai * q_i0$, where, a is the vector of connect rates). Applicants respectfully submit that this limitation would not have been well known to those of skill in the art at the time of invention. Thus, with respect to this limitation being "well known", the applicants respectfully request that the Examiner provide an affidavit as to the personal knowledge relied on within the meaning of MPEP

§2144.03 and 37 C.F.R. §1.107, or designate a reference or particular parts of the cited references and the pertinence of each reference in support of the rejection as required by 37 C.F.R. 1.106(b), which provides: "When a reference is complex or shows or describes inventions other than that claimed by the applicant, the particular part relied on must be designated as nearly as practicable. The pertinence of each reference, if not apparent, must be clearly explained and each rejected claim specified."

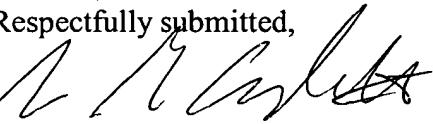
For at least the foregoing reasons, Applicants respectfully submit that the invention, as claimed in independent claim 1, as well as new independent claims 6 and 11, are not made obvious by Huang. Applicant further respectfully submits that claims 2-5, and new claims 7-10 and 12-15, which depend from independent claims 1, 6, and 11, respectively, are also not made obvious by Huang for at least the foregoing reasons. Applicant therefore respectfully submits that claims 1-15 are in condition for allowance.

CONCLUSION

In view of the amendments and remarks set forth herein, the application is believed to be in condition for allowance and a notice to that effect is solicited. Nonetheless, should any issues remain that might be subject to resolution through a telephonic interview, the Examiner is invited to telephone the undersigned at 512-439-5084.

I hereby certify that this correspondence is being deposited with the United States Postal Service as First Class Mail in an envelope addressed to: Mail Stop Amendment, Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450, on June 14, 2004 .	
	
Attorney for Applicants	Date of Signature

Respectfully submitted,



Samuel G. Campbell, III
Attorney for Applicants
Reg. No. 42,381
Telephone: (512) 439-5084
Facsimile: (512) 439-5099